



LISTING INFORMATION OF  
**Redbuilt Open-web Truss & Red-I Joist Series**  
SPEC ID: 34742

Redbuilt, LLC  
200 E. Mallard Drive  
Boise, ID 83706  
United States

This report is for the exclusive use of Intertek's Client and is provided pursuant to the agreement between Intertek and its Client. Intertek's responsibility and liability are limited to the terms and conditions of the agreement. Intertek assumes no liability to any party, other than to the Client in accordance with the agreement, for any loss, expense or damage occasioned by the use of this report. Only the Client is authorized to permit copying or distribution of this report and then only in its entirety. Any use of the Intertek name or one of its marks for the sale or advertisement of the tested material, product or service must first be approved in writing by Intertek. The observations and test results in this report are relevant only to the sample tested. This report by itself does not imply that the material, product, or service is or has ever been under an Intertek certification program.

## LISTING INFORMATION

Redbuilt Open-web Truss & Red-I Joist Series are pre-fabricated Open web pin connected joists and I-joists consisting of dimensional or Structural Composite Lumber flanges and tube steel or OSB web stock. The specific Product Descriptions are presented in the tables below:

### Redbuilt Red-I Joist Series

Joist Series	Joist Depth Range (inches)	Flange Thickness x Width (inches)	Web Material and Thickness (inches)
Red-I45L	9-1/2 – 14	1.375 (min) x 1.75	3/8 OSB Webstock
Red-I53	9-1/4 – 16	1.375 (min) x 2.10	3/8 OSB Webstock
Red-I58	9-1/4 – 16	1.375 (min) x 2.31	3/8 OSB Webstock
Red-I45	7-1/2 – 20 (8-20 taper)	1.5 x 1.75	3/8 OSB Webstock
Red-I65	7-1/2 – 30 (7-1/2 - 30 taper)	1.5 (min) x 2.5	7/16 OSB Webstock
Red-I90	9-1/2 – 30 (9-1/2 – 30 taper)	1.5 x 3.5	7/16 OSB Webstock
Red-I90H	11-7/8 – 30	1.75 x 3.5	7/16 OSB Webstock
Red-I90HS	11-7/8 – 32	2.5 x 3.5	1/2 OSB Webstock

### Redbuilt Open-Web Truss Series

Truss Series	Nominal Member Size	Chord Thickness x Width (inches)	Pin Diameter (inches)
Red-L	(1) 2x4	1.5 x 3.5	3/8, 5/8
Red-W	(1) 2x6	1.5 x 4.75	3/8, 5/8
Red-S	(2) 2x3	1.5 x 2.30	1/2, 3/4
Red-M	(2) 2x4	1.5 x 3.5	5/8, 1
Red-H	(2) 2x6	1.5 x 5.5	3/4, 1 1/4

### Ratings:

Standard	Rating	Design Number
----------	--------	---------------

ASTM E119 and CAN/ULC S101	45-Minute	RBL/SFWT 45-01
	60-Minute	RBL/SFWT 60-01
	60-Minute	RBL/SFWT 60-02
	60-Minute	RBL/SFWT 60-03
	60-Minute	RBL/SFWT 60-04
	60-Minute	RBL/SFWT 60-05
	60-Minute	RBL/SFWT 60-06
	60-Minute	RBL/SFWT 60-07
	90-Minute	RBL/SFWT 90-01
	120-Minute	RBL/SFWT120-01

Attribute	Value
Criteria	CAN / ULC S101 (2007)
Criteria	ASTM E119 (2012a)
CSI Code	06 17 53 Shop-Fabricated Wood Trusses
Intertek Services	Certification
Listed or Inspected	LISTED
Listing Section	PREFABRICATED JOISTS, COLUMNS & OPEN WEB TRUSSES
Spec ID	34742

## DRAWING INDEX

RBL/SFWT 120-01

RBL/SFWT 45-01

RBL/SFWT 60-01

RBL/SFWT 60-02

RBL/SFWT 60-03

RBL/SFWT 60-04

RBL/SFWT 60-06

RBL/SFWT 60-07

RBL/SFWT 90-01

RBL/SWFT 60-05

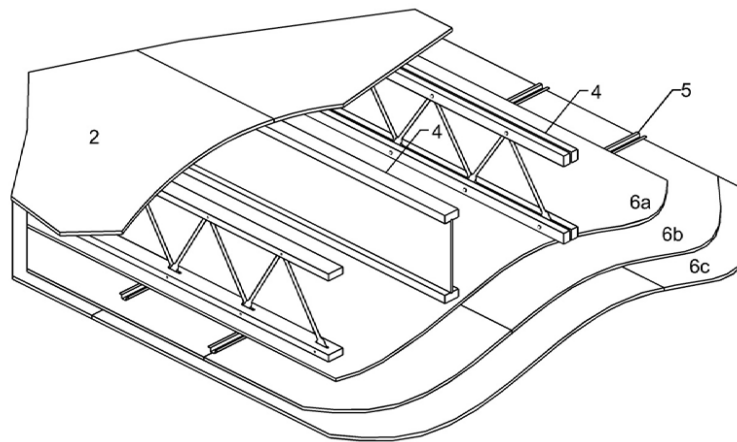
## RBL/SFWT 120-01

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

### Design Number RBL/SFWT 120-01 REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES

RedBuilt LLC  
ASTM E119 and CAN/ULC S101  
Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
120-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, installed per code requirements.

3. INSULATION (Optional): When installed, insulation shall be supported by stay wires spaced a min. of 12 in. on center (oc).

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I45L, RED-I53, RED-I58, RED-I45, RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

9-1/4 in. min. deep joists spaced a max. of 24 in. oc. Installed in accordance with the Code.

5. RESILIENT CHANNELS: Min. 0.019 in. thick galvanized steel resilient channels, attached perpendicular to joists using 1-5/8 inch long drywall screws. Resilient channels spaced 16 in. oc (channels installed after first layer of gypsum and used to support the

Date: January 10, 2015  
Project No: G101747563

Intertek

## RBL/SFWT 120-01 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

second and third layers of gypsum wallboard).

6. GYPSUM WALLBOARD: Three layers of min. 5/8 in. Type C gypsum wallboard as follows:

6a. Wallboard Base Layer: Base layer of wallboard installed perpendicular to the joists and directly attached to the bottom flange using 1-5/8 in. Type S drywall screws at 12 in. oc. End joints of wallboard centered on bottom flange and staggered a min. of one joist spacing.

6b. Wallboard Middle Layer: Middle layer of wallboard attached to channels using 1 in. Type S drywall screws spaced 12 in. oc with the long dimension of wallboard perpendicular to channels. Edge joints shall be centered on the joists and offset a min. of one joist spacing from base layer end joints. End joints staggered a min. of one channel spacing and offset from the edge joints in the base layer a min. of one channel spacing.

6c. Wallboard Face Layer: Face layer of wallboard attached to channels through middle layer using 1-5/8 in. Type S drywall screws spaced 8 in. oc. Edge joints of face layer wallboard joints shall be centered on the joists and offset a min. distance equal to the joist spacing from those of middle layer. End joints of face layer of wallboard staggered a min. of one channel spacing and offset a min. of one channel spacing with respect to the middle layer end joint and base layer edge joint.

7. FINISH SYSTEM (Not shown): Face layer joints covered with tape and coated with joint compound. Screw heads covered with joint compound.

Date: January 10, 2015  
Project No: G101747563

Intertek

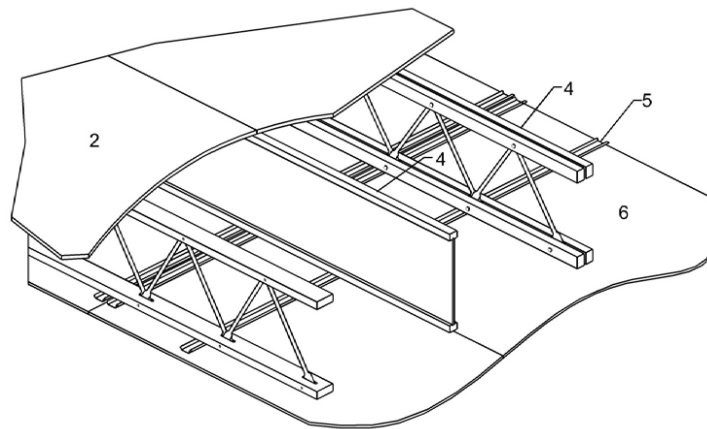
**RBL/SFWT 45-01**

06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

**Design Number RBL/SFWT 45-01**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**

RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 45-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, designed and installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION (Optional, not shown): When installed, insulation shall be installed above the joist flanges and supported by stay wires spaced a min. of 12 in. on center (oc).

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I45L, RED-I53, RED-I58, RED-I45, RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

9-1/4 in. min. deep joists spaced a max. of 24 in. oc. Installed in accordance with the Code.

5. RESILIENT CHANNELS: Min. 0.019 in. thick galvanized steel resilient channel attached perpendicular to the bottom flange of the joists with one 1-5/8 in. drywall screw. Channels spaced 16 in. oc max.. Additional channels are required at gypsum board end

Date: January 10, 2015  
 Project No: G101747563

**Intertek**

## RBL/SFWT 45-01 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

joints so that each board is attached to a separate channel. These additional channels shall extend to the next joist on each side of the board end joint.

6. GYPSUM WALLBOARD: Min. 5/8 in. thick Type X gypsum wallboard installed with long dimension perpendicular to resilient channels and fastened to each channel with min. 1-1/8 in. long Type S drywall screws. Fasteners spaced 12 in. oc in the field, 8 in. oc at wallboard end joints, and 1 1/2 in. from panel edges and ends. Edge joints shall be centered on joists. End joints of wallboard staggered a min. of one channel spacing.

7. FINISH SYSTEM (not shown): Face layer joints covered with tape and coated with joint compound. Screw heads covered with joint compound.

Date: January 10, 2015  
Project No: G101747563

Intertek



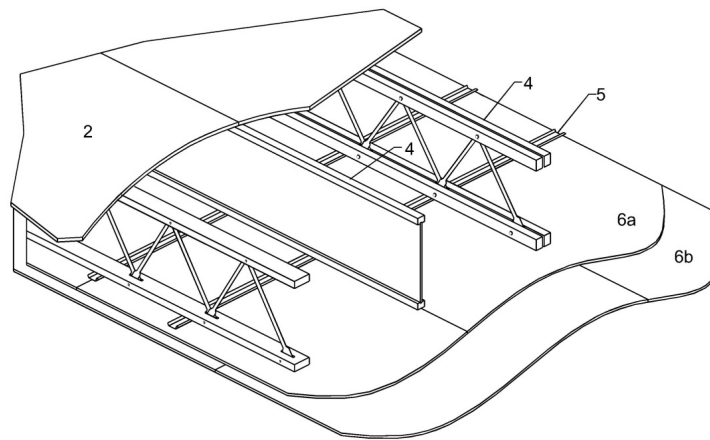
## RBL/SFWT 60-01

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

### Design Number RBL/SFWT 60-01 REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES

RedBuilt LLC  
ASTM E119 and CAN/ULC S101  
Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
60-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, designed and installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION (Optional, not shown): When installed, insulation shall be installed above the joist flanges and supported by stay wires spaced a min. of 12 in. On Center (oc).

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I45L, RED-I53, RED-I58, RED-I45, RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

9-1/4 in. min. deep joists spaced a max. of 24 in. oc. Installed in accordance with the Code. The max. spacing may be increased to 48 in. oc when the ceiling is applied to stripping spaced a max. of 24 in. oc. The stripping must be a nominal 2 X 4, construction-grade lumber attached to the

Date: January 10, 2015  
Project No: G101747563

Intertek

## RBL/SFWT 60-01 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

bottom flange of the joists using two 10d nails.

5. RESILIENT CHANNELS (Optional): Min. 0.019 in. thick galvanized steel resilient channel attached perpendicular to the bottom flange of the joists with one 1-1/4 in. drywall screw. Channels spaced a max. of 16 in. oc. The max. channel spacing may be increased to 24 in. oc when joists are spaced a max. of 16 in. oc.

6. GYPSUM WALLBOARD: Two layers of min. 1/2 in. Type X gypsum wallboard attached with the long dimension perpendicular to the resilient channels (or joists) as follows:

6a. Wallboard Base Layer: Base layer of wallboard attached to resilient channels (or joists) using 1-1/4 in. type S drywall screws at 12 in. oc. When resilient channels are installed, edge joints shall be centered on joists. End joints of wallboard staggered a min. of one channel (or joist) spacing.

6b. Wallboard Face Layer: Face layer of wallboard attached to resilient channels (or joists) through base layer using 1-5/8 in. Type S drywall screws spaced 12 in. oc. Edge joints of wallboard face layer offset a min. distance equal to the joist spacing, from those of base layer. End joints shall be offset from base layer joints by a min. of one channel (or joist) spacing and shall be centered in-between channel (or joist) spacings. Additionally, wallboard face layer attached to base layer with 1-1/2 in. Type G drywall screws spaced 8 in. oc, placed 1-1/2 in. from face layer end joints.

7. FINISH SYSTEM (not shown): Face layer joints covered with tape and coated with joint compound. Screw heads covered with joint compound.

Date: January 10, 2015  
Project No: G101747563

Intertek

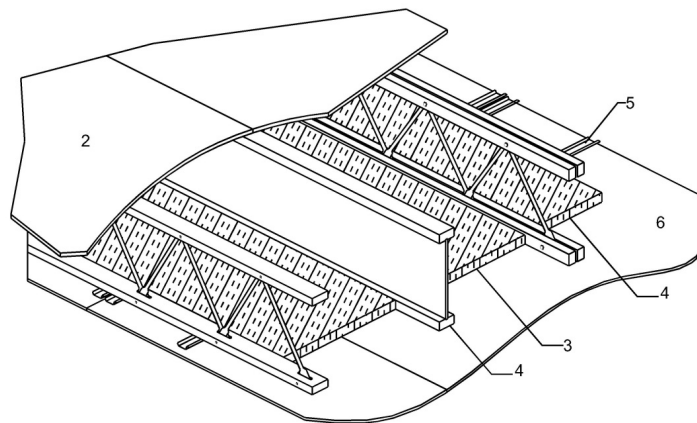
**RBL/SFWT 60-02**

06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

**Design Number RBL/SFWT 60-02**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**

RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 60-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, designed and installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION: Min. 1-1/2 in. thick mineral wool insulation batts – 2.5 pcf (min.), friction fitted between the bottom flanges of the joists and supported by resilient channels. Ends of batts shall be centered over resilient channels and tightly butted.

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-M and RED-H.

9-1/4 min. deep joists spaced a max. of 24 in. on center (oc) (Min. 1-1/2 in. X 3-1/2 in. bottom flange dimensions). Installed in accordance with the Code. The max. spacing may be increased to 48 in. oc when the ceiling is applied to stripping spaced a max. of 24 in. oc. The stripping must be a nominal 2 in. X 4 in., construction-grade lumber attached to the joists bottom flange using two 10d nails.

Date: January 10, 2015  
 Project No: G101747563

**Intertek**

## RBL/SFWT 60-02 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

5. RESILIENT CHANNELS: Min. 0.019 in. thick galvanized steel resilient channels, attached perpendicular to joists using 1-5/8 inch long drywall screws. Resilient channels spaced a max. of 16 in. oc. Additional channels are required at gypsum board end joints so that each board is attached to a separate channel. These additional channels shall extend to the next joist on each side of the board end joint.

6. GYPSUM WALLBOARD: Min. 5/8 in. thick Type C gypsum wallboard installed with long dimension perpendicular to resilient channels and fastened to each channel with min. 1 in. long Type S drywall screws. Fasteners spaced 12 in. oc in the field, 8 in. oc at wallboard end joints, and 1-1/2 in. from panel edges and ends. Edge joints shall be centered between joists. End joints shall be staggered one channel spacing.

7. FINISH SYSTEM (not shown): Face layer joints covered with tape and coated with joint compound. Screw heads covered with joint compound.

Date: January 10, 2015  
Project No: G101747563

Intertek

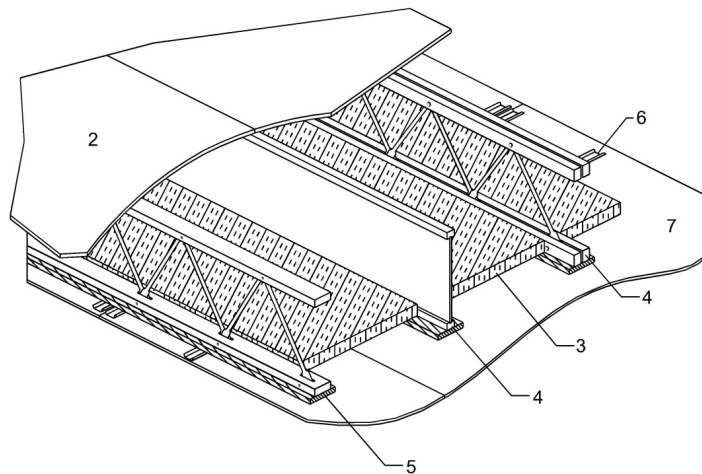
**RBL/SFWT 60-03**

06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

**Design Number RBL/SFWT 60-03**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**

RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 60-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, designed and installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION: Min. 2 in. thick mineral wool insulation batts – 3.5 pcf (min.), supported by setting strip edges, friction-fitted between the sides of the joist flanges. Ends of batts shall be centered over resilient channels and tightly butted.

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I45L, RED-I53, RED-I58, RED-I45, RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

9 1/4 in. min. deep joists spaced a max. of 24 in. on center (oc). Installed in accordance with the Code.

5. SETTING STRIPS: Min. 1x4 (nominal) wood setting strips attached with 1-1/2 in. long Type W screws at 24 in. oc along the

Date: January 10, 2015  
 Project No: G101747563

**Intertek**

## RBL/SFWT 60-03 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

bottom flange of joist creating a ledge to support insulation.

6. RESILIENT CHANNELS: Min. 0.019 in. thick galvanized steel resilient channels, attached perpendicular to joists using 1-5/8 in. long drywall screws. Resilient channels spaced 16 in. oc. Additional channels are required at gypsum board end joints so that each board is attached to a separate channel. These additional channels shall extend to the next joist on each side of the board end joint.

7. GYPSUM WALLBOARD: Min. 5/8 in. thick Type C gypsum wallboard installed with long dimension perpendicular to resilient channels and fastened to each channel with min. 1-1/8 in. long Type S drywall screws. Fasteners spaced 7 inches oc and 1-1/2 in. from panel edges and ends. Edge joints shall be centered between joists. End joints shall be staggered one channel spacing.

8. FINISH SYSTEM (Not Shown): Face layer joints covered with tape and coated with joint compound. Screw heads covered with joint compound.

Date: January 10, 2015  
Project No: G101747563

Intertek

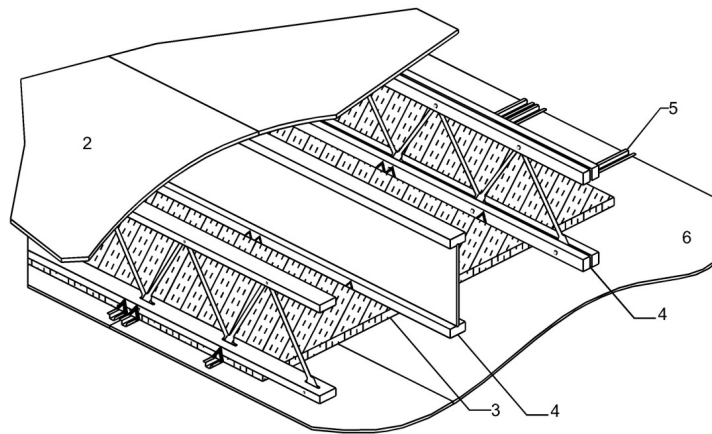
**RBL/SFWT 60-04**

06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

**Design Number RBL/SFWT 60-04**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**

RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 60-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 23/32 in. thick tongue-and-groove wood sheathing, designed and installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION: Min. 1 in. thick mineral wool insulation batts – 6 pcf (min.). Batts installed on top of furring channels and under bottom flange of joists with the sides butted against support clips. The ends of the batts shall be centered over furring channels and tightly butted.

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-M and RED-H.

9 1/4 in. min. deep joists spaced a max. of 24 in. on center (oc) (Min. 1-1/2 in. by 2 5/16 in. bottom flange dimensions). Installed in accordance with the Code.

5. FURRING CHANNELS: Min. 0.0179 in. thick galvanized steel hat-shaped furring channels, attached perpendicular to joists

Date: January 10, 2015  
 Project No: G101747563

**Intertek**

## RBL/SFWT 60-04 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

spaced 24 in. oc. Channels secured to I-joists with Simpson Type CSC support clips at each intersection with the joists. Clips nailed to the side of joist bottom flange with one 1-1/2 in. long No 11 GA nail. Additional channels are required at gypsum board end joints so that each board is attached to a separate channel. These additional channels shall extend to the next joist on each side of the board end joint.

6. GYPSUM WALLBOARD: Min. 1/2 in. thick Type C gypsum wallboard. Wallboard installed with long dimension perpendicular to furring channels and fastened to each channel with min. 1 in. long Type S drywall screws. Fasteners spaced 12 in. oc in the field of the wallboard, 6 in. oc at wallboard end joints, and 1-1/2 in. from panel edges and ends. Edge joints shall be centered between joists. End joints shall be staggered one channel spacing and offset from insulation joints by a min. of one channel spacing.

7. FINISH SYSTEM (Not Shown): Face layer joints covered with tape and coated with joint compound. Screw heads covered with joint compound.

Date: January 10, 2015  
Project No: G101747563

Intertek



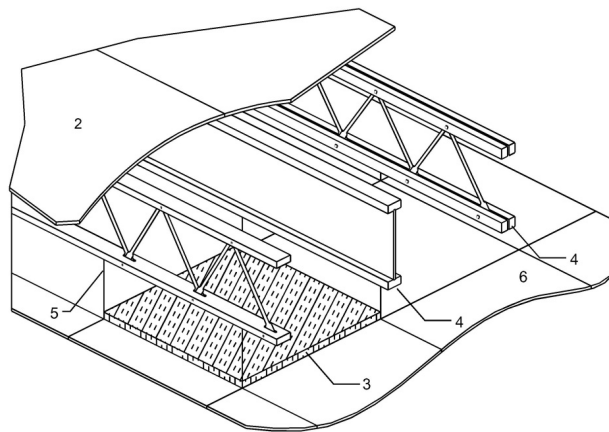
**RBL/SFWT 60-06**

06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

**Design Number RBL/SFWT 60-06**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**

RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 60-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Double wood floor consisting of min. 1 in. thick wood sheathing subfloor and 5/8 in. thick wood sheathing finish floor, designed and installed per code requirements. Min. 3/4 in. thick concrete topping, as describe in item 1 may be substituted for finish flooring. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION: Min. 1 in. thick: 4 pcf Thermafiber® Sound Attenuation Fire Blankets, or Fibrex®-FBX 1240 Industrial

Boards, or Fibrex®-IF 1240 Flex Batts, or IIG MinWool®-1240 Industrial Board, or IIG MinWool®-1240 Flexible Batt. Insulation shall be installed over the ceiling panels.

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I45, RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

9-1/4 in. min. deep joists spaced a max. of 24 in. on center (oc) (Min. flange depth 1-1/2 in.). Installed in accordance with the Code.

Date: January 10, 2015  
 Project No: G101747563

**Intertek**

## RBL/SFWT 60-06 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

5. SUSPENSION SYSTEM: The panels shall be supported by a fire resistance rated suspension system, listed for use with assemblies utilizing wood framing for a time period equal to or greater than this assembly rating. The distance from the bottom of the joists to the suspended ceiling must be a min. of 10 in..

6. SUSPENDED CEILING: The suspended ceiling panels shall be min. 5/8 in. thick, 2 ft.X 2 ft. or 2 ft. X 4 ft., USG FIRECODE AURATONE lay-in acoustical board.

7. LIGHT FIXTURES (Optional, not shown): Max. 2 ft. X 4 ft. are permitted to be installed in the ceiling, provided the aggregate area of fixtures does not exceed 12 square feet per 100 square feet of ceiling area.

8. AIR DIFFUSERS (Optional, not shown): Ceiling opening for air diffusers, up to a max. of 12 in. in diameter, are permitted, provided the opening is protected with approved fire dampers and the aggregate areas do not exceed 113 square in. per 100 square-feet of ceiling area.

9. FIXTURE PROTECTION (Not shown): Ceiling opening for air diffusers, up to a max. of 12 in. in diameter, are permitted, provided the opening is protected with approved fire dampers and the aggregate areas do not exceed 113 square in. per 100-square-feet of ceiling area.

Date: January 10, 2015  
Project No: G101747563

Intertek

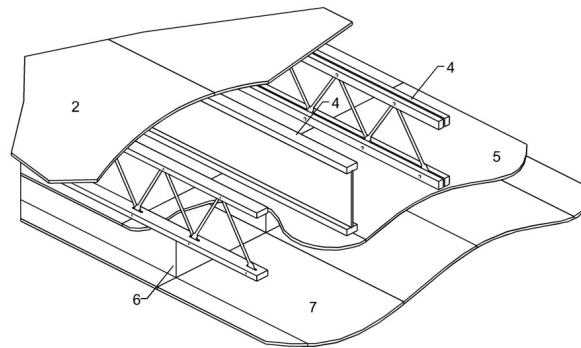
**RBL/SFWT 60-07**

06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

**Design Number RBL/SFWT 60-07**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**

RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 60-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, designed and installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION (Optional, not shown): Installed in the cavity between the joists. When installed, insulation shall be supported by stay wires spaced a min. of 12 in. On Center (oc)..

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

**CERTIFIED MODELS:**

RED-I JOIST SERIES: RED-I45L, RED-I53, RED-I58, RED-I45, RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

Min. 9-1/4 in. deep joists spaced a max. of 24 in. oc. Installed in accordance with the Code. The max. spacing may be increased to 48 in. oc when the ceiling is applied to stripping spaced a max. of 24 in. oc. The stripping must be a nominal 2 by 4, construction-grade lumber attached to the joists bottom flange using two 10d nails.

5. CEILING MEMBRANE (Directly attached to joists): The ceiling membrane must be installed perpendicular to the joists (or stripping) and must consist of a single layer of min. 1/2 in. thick, Type X gypsum board. The gypsum board is fastened using 1-5/8 in. long, Type S screws spaced 6 in. oc at the edges and 8 in. oc in the field.

Date: January 10, 2015  
 Project No: G101747563

**Intertek**

## RBL/SFWT 60-07 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

6. SUSPENDED SYSTEM: The panels shall be supported by a fire-resistance-rated suspension system, listed for use with assemblies utilizing wood framing for a time period equal to or greater than this assembly rating. The distance from the bottom of the joists to the suspended ceiling must be a min. of 12 in..

7. SUSPENDED CEILING: The suspended ceiling panels shall be min. 5/8 in. thick, 2 ft. X 2 ft. or 2 ft. X 4 ft., USG FIRECODE AURATONE lay-in acoustical board.

8. LIGHT FIXTURES (Optional, not shown): Max. size 2 ft. X 4 ft. are permitted to be installed in the ceiling, provided the aggregate area of fixtures does not exceed 12 square ft. per 100 square ft. of ceiling area.

9. RETURN AIR DUCT (Optional, not shown): A galvanized steel duct is permitted for each 200 square ft. of ceiling, provided the duct has a max. 12 in. diameter steel diffuser opening without a damper, and a max. 6 in. by 12 in. return air opening.

10. FIXTURE PROTECTION (Not shown): A galvanized steel duct is permitted for each 200 square feet of ceiling, provided the duct has a max. 12 in. diameter steel diffuser opening without a damper, and a max. 6 in. X 12 in. return air opening.

Date: January 10, 2015  
Project No: G101747563

Intertek

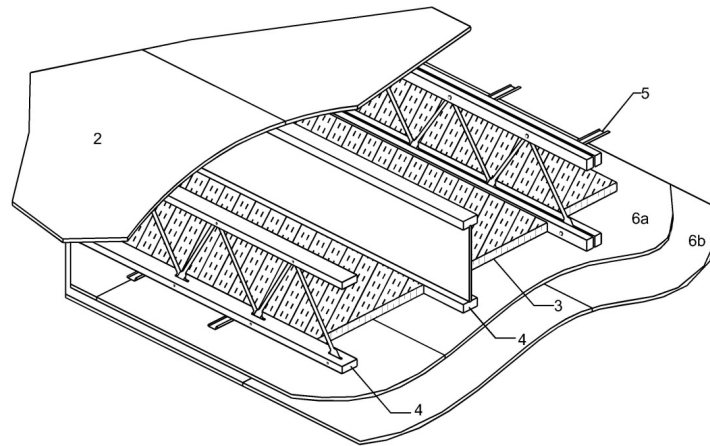
**RBL/SFWT 90-01**

06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

**Design Number RBL/SFWT 90-01**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**

RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 90-Minute Rating



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, installed per code requirements.

3. INSULATION: Min. 1-1/2 in. thick mineral wool insulation batts – 2.5 pcf (min.). Batt's installed on top of resilient channels with the sides butted against the sides of the joists. The ends of the batts shall be centered over resilient channels and tightly butted.

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

9-1/4 in. min. deep joists spaced a max. of 24 in. on center (oc) (Min. 1-1/2 in. by 2 5/16 in. flange dimensions). Installed in accordance with the Code.

5. RESILIENT CHANNELS: Min. 0.019 in. thick galvanized steel resilient channels, attached perpendicular to joists using 1-5/8

Date: January 10, 2015  
 Project No: G101747563

**Intertek**

## RBL/SFWT 90-01 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

in. long drywall screws. Resilient channels spaced a max. of 12 in. oc.

6. GYPSUM WALLBOARD: Two layers of min. 5/8 in. thick Type C gypsum wallboard as follows:

6a. Wallboard Base Layer: Base layer of wallboard attached to resilient channels using 1-1/4 in. type S drywall screws at 12 in. oc. Edge joints shall be centered between joists. End joints shall be staggered a min. of one channel spacing.

6b. Wallboard Face Layer: Face layer of wallboard attached to resilient channels through base layer using 1-5/8 in. Type S drywall screws spaced 12 in. oc, 6 in. oc at wallboard end joints, and 3/4 in. from panel edges and ends. Edge joints of wallboard face layer offset a min. distance equal to one joist spacing from those of base layer. End joints shall be offset from base layer joints by a min. of one channel spacing and shall be centered in-between channel spacing. Additionally, wallboard face layer attached to base layer with 1-1/2 in. Type G drywall screws spaced 8 in. oc, placed 1-1/2 in. from face layer end joints.

7. FINISH SYSTEM (Not shown): Face layer joints covered with tape and coated with joint compound. Screw heads covered with joint compound.

Date: January 10, 2015  
Project No: G101747563

Intertek

**RBL/SWFT 60-05**

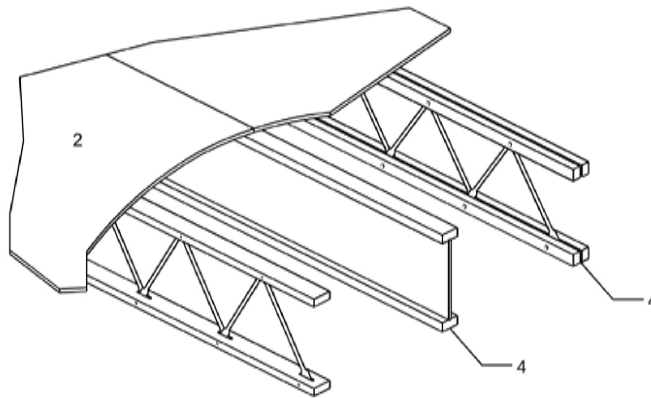
06 10 00 Rough Carpentry  
 06 17 00 Shop Fabricated Structural Wood  
 06 17 53 Shop Fabricated Wood Trusses

Page 1 of 2

---

**Design Number RBL/SFWT 60-05**  
**REDBUILT OPEN-WEB TRUSS & RED-I JOIST SERIES**  
 RedBuilt LLC  
 ASTM E119 and CAN/ULC S101  
 Load Bearing Fire Resistance Rated Roof/Ceiling, Floor/Ceiling Assembly  
 60-Minute Rating

---



1. FLOOR TOPPING (Optional, not shown): Gypsum concrete, lightweight or normal concrete topping. When used as a roof assembly, materials for a built-up roof covering that are described in an assembly that provides a Class A, B, or C rating on combustible wood decks may be used.

2. FLOOR SHEATHING: Min. 5/8 in. thick wood sheathing, designed and installed per code requirements. When used as a roof assembly, min. 1/2 in. thick wood sheathing may be used, when designed and installed per code requirements.

3. INSULATION (Optional, not shown): When installed, insulation shall be supported by stay wires spaced a min. of 12 in. on center (oc).

4. CERTIFIED COMPANY: RedBuilt LLC

CERTIFIED PRODUCT: Shop fabricated wood trusses

#### CERTIFIED MODELS:

RED-I JOIST SERIES: RED-I45L, RED-I53, RED-I58, RED-I45, RED-I65, RED-I90, RED-I90H and RED-I90HS.

OPEN-WEB TRUSS SERIES: RED-L, RED-W, RED-S, RED-M and RED-H.

Min. 9-1/4 in. deep joists spaced a max. of 24 in. oc. Installed in accordance with the Code. The max. spacing may be increased to 48 in. oc when the ceiling is applied to stripping spaced a max. of 24 in. oc. The stripping must be a nominal 2-by-4, construction-grade lumber attached to the joists bottom flange using two 10d nails.

5. CEILING (Not shown): An approved ceiling membrane that provides a min. 40-minute finish rating must be used. An example of an approved ceiling having a 40-minute finish rating is one that consists of two layers of 1/2 in. thick Type X gypsum

Date Revised: April 7, 2015  
 Project No. G101747563



## RBL/SWFT 60-05 (2 OF 2)

06 10 00 Rough Carpentry  
06 17 00 Shop Fabricated Structural Wood  
06 17 53 Shop Fabricated Wood Trusses

Page 2 of 2

board complying with ASTM C36 or ASTM C1396. Substantiating data, including a report of the fire-endurance testing conducted in accordance with ASTM E119, must be furnished to the Authority Having Jurisdiction (AHJ) to verify it meets the

40-minute finish rating requirements. The finish rating must be determined in accordance with Section 47 of ASTM E119. The finish rating is defined in Section 48 of ASTM E119.

---

Date Revised: April 7, 2015  
Project No. G101747563



Valued Quality. Delivered.